### LAND RECLAMATION COMMISSION

### STATE OF MISSOURI

P.O. BOX 176 JEFFERSON CITY, MISSOURI 65102 573-751-4041

Permit To Engage in Surface Mining	
LAND RECLAMATION COMMISSION	

### **ISSUES TO**

### TOWER ROCK STONE COMPANY

Pursuant to "The Land Reclamation Act," RSMo, 2001, and on conformity with the statements
In the application, a permit is hereby granted to engage in surface mining of
limestone in the state of Missouri. The extent of the
Proposed mining operation(s) will be on 475 acres, more or less.

The locations of the operation(s) under this permit is/are as follows: Renewal

County	Section	Township	Range	Acres	Acres	Total	Site/Stream	Site
				Renewed	New	Acres	Name	Number
Ste. Genevieve	07	38N	09E	164	0	164	Site #1	0317
Ste. Genevieve	12	38N	08E	195	0	195	Site #2	0318
Ste. Genevieve	13, 14, 23, & 24	38N	08E	116	0	116	Southern Expansion	1997
	17, 18, & 19	38N	09E					
						1		

This permit may be suspended or revoked upon violation of any or all of the conditions set forth in "The Land Reclamation Act," RSMo. 2001, or in such rules and regulations as are promulgated pursuant thereto by the Land Reclamation Commission.

IN WITNESS WHEREOF I have hereunto set my hand this

12th day of March 2004

DIRECTOR OF STAFF

Land Reclamation Commission

Permit No. 0237

Effective Date 03/22/2004

Expiration Date 03/21/2005

MO 780-1122 (6-95)



MISSOURI DEPARTMENT OF NATURAL RESOURCES

LAND RECLAMATION COMMIS	SSION	- MA	K Z 200	4	
PERMIT RENEWAL FOR	INDUSTRIAL MINI	ERAL MINES MIS	SSOURI LANE	P.O. BOX 176 JEFFERSON	CITY, MO 65102-0176
NAME OF CORPORATION, COMPANY, PARTNERSHIP OR INDIV		ICCLAM	SSOURI LANE ATION COMM		25 2004
Tower Rock Stone Co St	e. Genevieve	СПУ		STATE	y 25, 2004
P.O. Box 50		Columbia		I1	62236
Rodney Linker/Mike	Sturdevant			15 TELEPHONE NUMBER 618-281-4	106
FEES: COMPLETE SECTION I OR SECTIO				· · · · · · · · · · · · · · · · · · ·	
SECTION I. Fees: Open pit operators and		an 5,000 tons of sand	l and/or grav	el:	
1. To compute the site fee complete the in	formation below:			·	
SITE NAME OR NUMBER (add a separate sheet for additional sites)	Mark each month that the permit year	at the site will be ope	rated during	permit year pay \$150	x months or more per
1. Site #1, #2, Southern Exp.	Jan, Feb, Mar, Apr, Ma	ay, Jun, Jul, Aug, Sep, (	Oct, Nov, Dec	\$ 300	
2.	Jan, Feb, Mar, Apr, Ma	ay, Jun, Jul, Aug, Sep, (	Oct, Nov, Dec	\$	
3.	Jan, Feb, Mar, Apr, Ma	y, Jun, Jul, Aug, Sep, (	Oct. Nov, Dec	\$	
4.	Jan, Feb, Mar, Apr, Ma	ıy, Jun, Jul, Aug, Sep, (	Oct, Nov, Dec	\$	
5.	Jan, Feb, Mar, Apr, Ma	y, Jun, Jul, Aug, Sep, (	Oct, Nov, Dec	\$	
6.	Jan, Feb, Mar, Apr, Ma	ıy, <mark>Jun,</mark> Jul, Aug, Sep, (	Oct, Nov, Dec	\$	
7.	Jan, Feb, Mar, Apr, Ma	ıy, Jun, Jul, Aug, Sep, (	Oct, Nov, Dec	\$	
8.	Jan, Feb, Mar, Apr, Ma	ıy, Jun, Jul, Aug, Sep, C	Oct, Nov, Dec	\$	
9.	Jan, Feb, Mar, Apr, Ma	y, Jun, Jul, Aug, Sep, C	Oct, Nov, Dec	\$	
10.	Jan, Feb, Mar, Apr, Ma	y, Jun, Jul, Aug, Sep, C	Oct, Nov, Dec	\$	
TOTAL SITE FEE				\$ 300	
2. Acreage Fee \$5 X <u>475</u> number o	f acres bonded			.\$ 2375	
3. Annual Permit Fee			•••••	.\$ 500	
4. Total Fee (Add totals from 1, 2 and 3)				.\$ 3175	
NOTE: If Total Fee exceeds \$2,500.00 the	n pay only		•••••••••••••••••••••••••••••••••••••••	.\$ 2,500	
SECTION II. FEES: Sand or gravel operator	rs mining less than 5,	000 tons per year:		·	
1. Annual Permit Fee	•••••			.\$ 300	
SIGNATURE OF APPLICANT	1	TITLE		DATE	07 000/
Kodny C. Jul	ac .	Vice Pres	sident	Februa	ry 27, 2004
Appeared before me this day of			Rodney E.	Linker	
to me personally known, who executed the ab	ove as their free acts a	ind deeds.	COUNTY (GR-CH	T <del>Y OF ST. LOUIS</del> )	
Illinois				_	
SUBSCRIBED AND S	SWORN BEFORE ME, THIS DAY OF Marc	h year 2004		ionroe	D ADEA DEL OW
NOTARY PUBLIC SK	SNATURE	MY COMMISSION EXPIRES	1 10000	State of Illinois	
Class	1 7.6.	2/27/07	Je	en A. Fehr, Notan	y Public
NOTAY PUBLIC NA	ME (TYPED OR PRINTED)	1 2/2//0/	My Com	mission Expires Febr	uery 27, 2007
FOR DESCRIPTION APPROVED BY	Fehr DATE APPROVED	PERMIT NUMB	ER _	EXPIRATION DA	TÉ
William Statille	3-11-04	- 1 -	237	3-2/	



MO 780-1036 (12-02)

## MISSOURI DEPARTMENT OF TURAL RESOURCES LAND RECLAMATION COMMISSION SITE INFORMATION



P.O. BOX 176 JEFFERSON CITY, MO 65102-0176

		3ETT ENSON CITT, NO 03102-017			
ed with mining or	perations.				
		PERMIT NUMBER			
Ste. Genevieve Quarry - Southern Expansion					
SW - S131	SW -S17	SECTION			
= S23 E - S24	SE -S18 SW -S19	13, 14, 23, 24, - R8E 17, 18, 19, - R9E			
	<del></del>	ACRES M.P.S. 06/26/03			
R8E	R9E	1402 1402 1419 ac. M.A.S.			
		***************************************			
ESTIMATED TO	NS/YEAR (GR	AVEL SITES)			
N/	'A				
		<i>,</i> ·			
STATE		ZIP CODE			
МО	MO 63670				
		DATE OF AGREEMENT			
LEASE	☐ LEASE April 01, 2000				
VERBAL					
_					
STATE	n	ZIP CODE 63670			
MC	J	03070			
		DATE OF AGREEMENT			
LEASE		April 01, 2000			
П.,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,					
r vehrar					
	STATE MO  STATE  STATE  STATE  MO  STATE  MO	R8E R9E  ESTIMATED TONS/YEAR (GR N/A)  STATE MO  LEASE VERBAL  STATE MO			



P.O. BOX 176 JEFFERSON CITY, MO 65102-0176

- # 55 E E E E	OLI	E110011 011 1, 140 05102-0170
COMPANY NAME Tower Rock Stone Co.		
TYPE OF PLAN (CHECK ONE):		
SHORT TERM, FOR ONE PERMIT YEAR		
X LONG TERM, FOR PERIOD THROUGH DATE: March 31, 2053		
DESCRIPTION OF SITE PRIOR TO LAND RECLAMATION COMMISSION PERMITTI	IG (BY APPLICANT OR PRIOR OPERATOR) INCLUDE	ING SOIL VEGETATION AND
TOPOGRAPHY.		
The area has natural rock bluffs wi		•
land with wooded areas. Some of the existing	slopes are non- farmable in the	at farm machinery
is unable to traverse them.		
OPERATION PLAN - 10 CSR 40-10.020(2)(D)1.		
A. TOPSOIL		
AVERAGE DEPTH OF TOPSOIL, PRIOR TO LAND RECLAMATION COMMISSION PER	IS TOPSOIL TO BE SOLD	OR DISCARDED OFFSITE?
	12" INCHES ☐ YES OR X NO	
	INOTES EL TES ON LEINO	
DESCRIBE METHODS AND EQUIPMENT USED FOR TOPSOIL REMOVAL		
Dozers and scrapers will be used to	romovo and stocknile tongoil	materials
and will be stockpiled in stable areas to min		
will be removed and stockpiled or placed in a		
performed to determined type and amount of fe		
agricultural, pasture. or wildlife areas. The	application of fertilizers and	nutrients
will be applied at the time most suitable for	establishment of vegetation.	
DESCRIBE METHODS AND EQUIPMENT USED FOR TOPSOIL STORAGE AND PROT	ECTION	
Stockpiled topsoil will be seeded	and sloped to prevent erosion	and where
needed straw bales, silt fences or other meth	<del>_</del>	i i
and minimize loss.	ous will be used to intercept	eroded sorr
and minimize 1000.		
		İ
PERMIT NO. 0237	SITE NUMBER/NAME	
	Tower Rock Stone Co Ste.	Genevieve

MO 780-1327 (5-02)

PAGE 1 OF 5

DESCRIBE METHODS AND LOCATION OF SPOIL PLACEMENT AND DISPOSAL Spoil will be placed in the mined out portion of the quarry. The spoil will consist of overburden -soils, waste rock, non-usable processed rock. It will be handled by trucks and scrapers with distribution by dozers. Spoil piles will recieve rocky material first which will be covered with clean soil/topsoil and seeded as denoted in this plan. It will be graded to a traversable topography no steeper than (3:1). RECEIVED FEB 2 7 2003 MISSOURI LAND RECLAMATION COMMISSION C. ACID MATERIALS DESCRIBE METHODS AND EQUIPMENT USED FOR HANDLING ACID MATERIALS (IF NONE IS ANTICIPATED, WRITE "NONE" BELOW) D. PIT INFORMATION (GIVE ALL DIMENSIONS IN FEET) DESCRIBE LOCATION AND ORIENTATION OF PIT, IF NOT CLEAR ON SITE MAPS The current pit walls will extend south and southeast and will eventually extend southwest. Slopes in unconsolidated overburden excavation will be sloped to less than 40 degrees from the horizontal. YES NO X Will any excavation be at or within fifty feet (50') of the right-of-way of any public road? X Will any highwall consisting of unconsolidated materials be left within fifty feet of the right-of-way of any public road? (NOTE: For unconsolidated materials left in place, a slope of no more than forty degrees may start near the right-ofway, and in no case may the excavation be closer to the right-of-way than fifty feet or twenty-five feet plus one and one-half (1%) times the depth of unconsolidated material, whichever is greater, unless a variance is granted by the Commission.) X П Will any excavation start at or within fifty feet (50') of any property line? (NOTE: If the answer is "YES", a safety barrier may be needed.)

SITE NUMBER/NAME

Tower Rock Stone Co. - Ste. Genevieve

0237

PERMIT NO.

RECEIVED

APR 1 8 2003

Tower Rock Stone Co. 19829 Lower Frenchman's Rd. Ste. Genevieve, MO 63670

MISSOURI LAND RECLAMATION COMMISSIC

April 14, 2003

Addendum to Tower Rock Stone Co.'s Mine Reclamation Plan, page two of five, item three of three YES or NO boxes for the southern expansion dated 06/01/2003 through 06/01/2053.

Will any excavation start at or within fifty feet (50') of any property line?

YES. In the long term plan multiple landowners' property lines will be crossed and mined through. Safety barriers will be added as needed to protect the public and limit access to the active mine site.

### **Public Roadway Relocation** Memorandum of Understanding

The undersigned parties, Chemical Lime Company of Missouri, Inc., Tower Rock Stone Company (as operator), and the Ste. Genevieve County Special Road Commission, hereby acknowledge that, in the furtherance of surface mining of the lands proposed for expansion noted on application dated Feb. 24, 2003 by Tower Rock Stone, certain roads and infrastructure will require relocation as mining progresses beyond the present quarry limits.

The undersigned further hereby acknowledge and agree as follows:

- 1. As mining proceeds, relocation of any and/or all roads will be to mutually acceptable locations at times determined by the mine owner/operator.
- 2. Active mining will be prohibited within 50 feet of any currently designated Right-of-Way.
- 3. All associated construction will be to the standards set by the Ste. Genevieve County Special Road Commission.

For Chemical Lime Company

of Missouri, Inc.

For Tower Rock Stone Co.

Dated this 25 day of March, 2003

For Special Road District Anthony Basler General S

RECLAMATION PLAN - 10 CSR 40-10.020(2)(D)2.								
A. REVEGETATION (Attach additional	al sheets, if needed)							
REVEGETATION MIX #1  Mix #1	PURPOSE OR LAND USE Agricultural/Pastureland	B. SEEDING OR PLANTING TIME Mar, April, May, Sept, Oct, Nov						
DESCRIBE METHODS AND EQUIPMENT TO E	BE USED FOR SEEDING OR PLANTING							

During the first seeding season following topsoil replacement or substitute, the seed mix will be broadcast and harrowed. Reseading will be done as needed to achieve grass cover sufficient to control erosion.

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FEB 2 7 2003

MISSOURI LAND
Lime and fertilizer will be applied according to recommendations based upon soil test analyses from a qualified soils lab. Mulch WM is applied to all slopes exceeding 5:1.

SEEDED SPECIES	POUNDS/ACRE	TREE OR SHRUB	SPECIES	STEMS/ACRE
Ky 31 or Alta Fescue	50 #/ac.			
Perennial Ryegrass	20 #/ac.			
Red Fescue	10 #/ac.			
Oats	48 #/ac.		!	
REVEGETATION MIX #2	PURPOSE OR LAND USE	<u> </u>	B. SEEDING OR PLAN	TING TIME
Mix #2		Pasture		y, Sep,Oct, Nov.

DESCRIBE METHODS AND EQUIPMENT TO BE USED FOR SEEDING OR PLANTING

Same methods and equipment as above for Mix #1.

Lime and fertilizer will be applied according to recommendations based upon soil test analyses from a qualified soils lab. Mulch will be applied to all slopes exceeding 5:1.

SEEDED SPECIES	POUNDS/ACRE	TREE OR SHRUB SPECIES	STEMS/ACRE
Orchard Grass	8 #/ac.		
Alfalfa	10 #/ac.		
		'	

ATTACH ADDITIONAL SHEETS FOR ADDITIONAL SEED MIXES.

D237

SITE NUMBER/NAME
Tower Rock Stone Co. - Ste. Genevieve

#### **B. GRADING**

DESCRIBE PROPOSED RECLAIMED TOPOGRAPHY, INCLUDING SLOPES

Spoil areas will be graded to slopes treversable by farm machinery. An approximately 150-200 acre lake will be formed in the final pit. The lake will be designed to meet SCS standards. The high wall will remain, with protected slopes in unconsolidated overburden above not steeper than 40 degrees from the horizontal. A protective barrier of boulders or a berm may be utilized along portions of the highwall.

### C. DESCRIBE THE GENERAL SEQUENCE AND TIMING OF THE FOLLOWING ACTIVITIES

GRADING

Grading will be done in accordance with  $10\text{CSR}\ 40-10.050(10)(A)(C)$  as the pit advances and as spoil is placed in mined out portions of the quarry, subject to normal mine operation and safety requirements. Final grading will be completed within one year after mine use is terminated in a specific area.

REPLACEMENT OF TOPSOIL

Topsoil will be laid in accordance with 10CSR 40-10.050(10)(A)(C) within one year of final grading, except those areas to be used as roadways, building sites or parking areas.

REVEGETATION

Seed mixes in Part A, will be in accordance with 10CSR 40-10.050(10)(B)(C). Revegitation timing will depend upon completion of topsoil placement and the time of year.

AVERAGE DEPTH OF REPLACED TOPSOIL (INCHES)		
D. USE OF LAND WHEN RECLAIMED		
Estimate acreage of each land use below, after reclamation	ESTIMATED ACRES:	
Wildlife (forest or other habitat with livestock excluded)		-0-
Agricultural (pasture, cropland, and horticultural)		1,162 7,474
Development (residential, industrial, and recreational)	140 145 145	
Water impoundments (for wildlife, agriculture, or developm	ent)	100
PERMIT NO. #0237	SITE NUMBER/NAME Tower Rock Stone Co.	- Ste. Genevieve

FEB 2 7 2003

By my signature, I attest to the following:

MISSOURI LAND RECLAMATION COMMISSION

- 1. All statements made on this Mine Plan Form are correct, complete and true, to the best of my knowledge.
- 2. I or the company I am authorized to represent intend(s) to mine in accordance with this Mine Plan Form, and in accordance with the Missouri Land Reclamation Act, Sections 444.760 through 444.790, RSMo 2001, and all rules, regulations, orders, decisions and permits of the Missouri Land Reclamation Commission pertaining to my company's surface mining operations.
- 3. I have obtained the approval of all landowner's (for all lease agreements made after August 28, 1990 on leased land) for all proposed post-mining land uses.
- 4. I have obtained the approval of all landowner's, (for all lease agreements made after August 28, 1990 on leased land) for all proposed seed mixtures.
- 5. I have a valid agreement with all landowners which gives me the right to grant access to the Director of the Missouri Land Reclamation Commission and authorized representatives, and I grant such access, and further where I have no such right, I have attached signed affidavits from the landowners, granting such access.

SIGNATURE OF APPLICANT	1		TITLE		DATE	
Rolling 8.	Juhn		Vis for - Towe	Rock Store	2/24/2003	
NOTARY PUBLIC EMBOSSER	STATE			COUNTY (OR CIT	Y OF ST. LOUIS)	
	Illinois SUBSCRIBED AND SWORN BEFORE ME, 25th DAY OF Febru		YEAR 2003	Monroe	R STAMP IN CLEAR AREA BELOV	: N
NOT VALID	NOTARY PUBLIC SIGNATURE	uary	MY COMMISSION		A STAMP IN CLEAR AREA BELOV	٧.
<u>UNLESS</u> <u>NOTARIZED</u>	NOTARY PUBLIC NAME (TYPED OR PRINT  Jean A. Fehr	he TED)	2/27/03	€ My (	"OFFICIAL SEAL" Jean A. Fehr tary Public, State of Illinois Commission Expires 2/27/03	
FOR DEPARTMENT USE ON	LY			C C Television		
APPROVEDOY Rec	9		DATE APPROVED  4/11/03		PERMIT NUMBER C 23 7	
PERMIT NO. 6 237			SITE NUMBER/NAME	Southe	on Expansion.	

To be completed for each separate area of d	listurbance associated	with mining operations	3.
SITE NAME OR NUMBER		PERMIT NUMBER	
Tower Rock Stone Co Site #	1	# 237	
COMPANY NAME			
Tower Rock Stone Co.	1/4 SECTION		SECTION
	SE 4		Sec. 7
Ste. Genevieve TOWNSHIP	SW ½		Sec. 12
TOWNSHIP	R9E		566.5
T38N	R8E		337 Acres
RIVER OR STREAM NAME (FOR IN-STREAM ACRES)			
NA			
MINERAL COMMODITY		ESTIMATED TONS/YEAR (F	OR GRAVEL SITES)
Limestone		NA	
NAME OF LANDOWNER (ATTACH LIST IF MORE THAI	N ONE)		
See Attached List			
ADDRESS	·		
CITY		STATE	ZIP CODE
SOURCE OF RIGHT TO MINE (CHECK ONE):			DATE OF AGREEMENT
MINERAL DEED		X LEASE	
☐ WARRANTY DEED		VERBAL AGREEMENT	
OTHER (DESCRIBE):			
MINERAL RIGHTS OWNER (ATTACH LIST IF MORE TH	HAN ONE)		
ADDRESS			
ADDRESS			
CITY		STATE	ZIP CODE
CITY		STATE	ZIP CODE
SOURCE OF RIGHT TO MINE (CHECK ONE):  MINERAL DEED		П. г.	DATE OF AGREEMENT
		LI LEASE	
☐ WARRANTY DEED		L VERBAL AGREEMENT	
OTHER (DESCRIBE):	· · · · · · · · · · · · · · · · · · ·		
NOTE: Each site must be shown on a map a	and be included in a p	ublic notice and an app	roved mine plan.



## MISSOURI DEPARTMENT OF TURAL RESOURCES LAND RECLAMATION COMMISSION MINE PLAN



P.O. BOX 176 JEFFERSON CITY, MO 65102

TYPE OF PLAN (CHECK ONE):  SHORT TERM, FOR ONE PERMIT YEAR  Nong TERM, FOR PERIOD THROUGH DATE: 2012	
DESCRIPTION OF SITE PRIOR TO LAND RECLAMATION COMMISSION PERMITTING (BY APPLICANT OR AND TOPOGRAPHY.	PRIOR OPERATOR), INCLUDING SOIL, VEGETATION
Natural bluff with rock outcroppings and rolling agricultur wooded areas on steep, non-farmable slopes which vary from along the river.	
Soils are low to medium plasticity clays.	
RATION PLAN - 10 CSR 40-10.020(2)(D)1. A. IOPSOIL	
AVERAGE DEPTH OF TOPSOIL, PRIOR TO LAND RECLAMATION COMMISSION PERMITTING	IS TOPSOIL TO BE SOLD OR DISCARDED OFFSITE?
4" - 6" INCHES	YES OR NO
DESCRIBE METHODS AND EQUIPMENT USED FOR TOPSOIL REMOVAL	L
Dozers and scrapers will remove and stockpile topsoil mater Overburden clay will be removed and stockpiled or placed i Testing will be performed to determine type and amount of f necessary to support agricultural or pasture land use, and establishment of vegetation.	n areas ready for reclamation. ertilizers and nutrients
DESCRIBE METHODS AND EQUIPMENT USED FOR TOPSOIL STORAGE AND PROTECTION	
Stockpiled topsoil will be seeded to prevent erosion and st utilized to intercept eroded soil. Dozers and farm equipme initial phase and subsequent maintenance.	

F		
B. SPOI		
DESCRIBE	METHOD	S AND LOCATION OF SPOIL PLACEMENT AND DISPOSAL
bur scr Exi soi	den so apers sting 1/tops	be placed in mined out portion of the pit. This spoil will consist of overils, waste rock and non-usable processed rock. It will be handled by trucks and and distributed by dozers.  spoil piles will receive rocky material first which will be covered with clean oil and seeded as denoted in this application. It will be graded to a le topography no steeper than 3:1.
C. ACID		
DESCRIBE	METHOD	S AND EQUIPMENT USED FOR HANDLING ACID MATERIALS (IF NONE IS ANTICIPATED, WRITE "NONE" BELOW)
"No	ne"	
		ATION (GIVE ALL DIMENSIONS IN FEET) IN AND ORIENTATION OF PIT, IF NOT CLEAR ON SITE MAPS
Pit alor Not	ng the e that	Map. advance southeasterly from present face. A protective berm will remain in place property boundaries with fencing maintained during the mine's active term. a natural rock bluff prohibits entry from the Northeast. Slopes in unconsolidated n excavation will be sloped to less than 40 degrees from the horizontal.
YES	NO	
	$\mathbf{X}$	Will any excavation be at or within fifty feet (50') of the right-of-way of any public road?
	X	Will any highwall consisting of unconsolidated materials be left within fifty feet of the right-of-way of any public road? (NOTE: For unconsolidated materials left in place, a slope of no more than forty degrees may start near the right of way, and in no case may the excavation be closer to the right of way than fifty feet or twenty-five feet plus one and one-half (1-1/2) times the depth of unconsolidated material, whichever is greater, unless a variance is granted by the Commission.)
(X)		Will any excavation start at or within fifty feet (50') of any property line? Pock / Conc. I I I

(NOTE: If the answer is "yes", a safety barrier may be needed.)

RECLAMATION PLAN - 10 CSR 40-10.020(2)(D)2.  A. REVEGETATION (Attach additional sheets, if needed)							
#1	Agricultural/Pastureland	Spring or Fall					
DESCRIBE METHODS AND EQUIDMENT TO	DELISED FOR SEEDING OR DI ANTINO						

During the first seeding season following topsoil replacement or substitute, the seed mix will be broadcast and harrowed. Reseeding will be done as needed to achieve grass cover sufficient to control erosion.

Lime and fertilizer will be applied according to recommendations made, based on an analysis of soil texture and nutrients. Mulch will be applied to all slopes exceeding 5:1.

POUNDS/ACRE	TREE OR SHRUB SPECIES	STEMS/ACRE
50#		
48#		
	50# 20# 10#	50# 20# 10#

REVEGETATION MIX #2	PURPOSE OR LAND USE	B. SEEDING OR PLANTING TIME
#2	Pasture	Spring or Fall

DESCRIBE METHODS AND EQUIPMENT TO BE USED FOR SEEDING OR PLANTING

Same as above

Lime and fertilizer will be applied according to recommendations made, based on an analysis of soil texture and nutrients. Mulch will be applied to all slopes exceeding 5:1.

SEEDED SPECIES	POUNDS/ACRE	TREE OR SHRUB SPECIES	STEMS/ACRE
Orchard Grass Alfalfa	8# 10#		

ATTACH ADDITIONAL SHEETS FOR ADDITIONAL SEED MIXES.

### **B. GRADING**

DESCRIBE PROPOSED RECLAIMED TOPOGRAPHY, INCLUDING SLOPES

All spoil areas will be graded to slopes traversable by farm machinery. A 150 to 200 acre lake will be formed in the final pit. The lake will be designed to meet SCS standards for hydraulic requirements. The high wall will remain, with protected slopes in unconsolidated overburden above not steeper than 40 degrees to the horizontal. A protective barrier of large boulders may be utilized along portions of the high wall.

### C. DESCRIBE THE GENERAL SEQUENCE AND TIMING OF THE FOLLOWING ACTIVITIES

### GRADING

Grading will be done as the pit advances and as spoil is placed in the mined out portions of the pit, subject to normal mine operation and safety requirments. Final grading will be completed within one year after mine use is terminated in a specific area.

#### REPLACEMENT OF TOPSOIL

Topsoil will be laid down within one year after final grading, except those areas to be unindated, or left as industrial use areas. Topsoil will be replaced to a uniform depth of 12 inches and disced to reduce compaction.

### REVEGETATION

All topsoiled areas will be seeded during the first planting season following topsoil replacement and re-seeded as necessary.

### AVERAGE DEPTH OF REPLACED TOPSOIL (INCHES) 12"

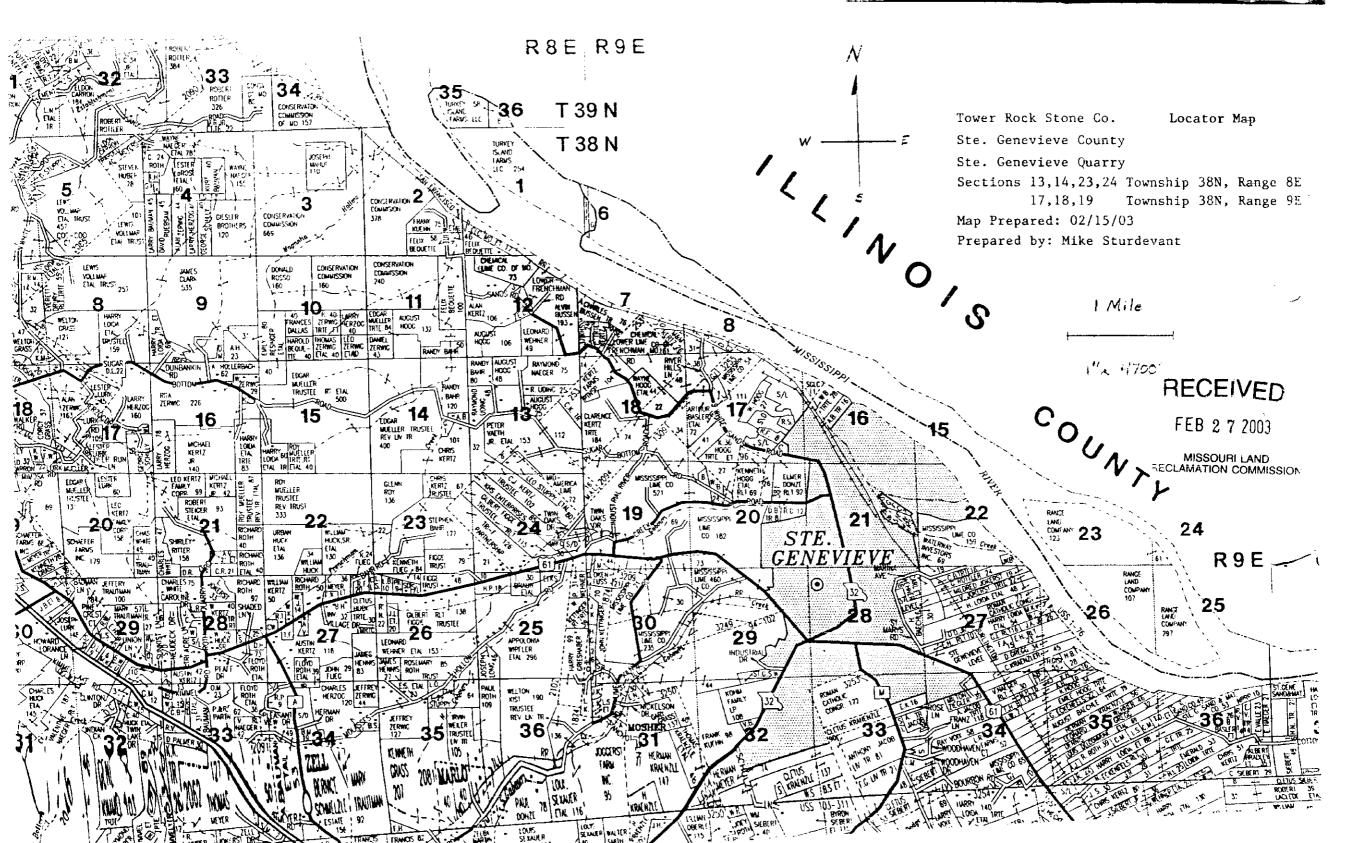
D. USE OF LAND WHEN RECLAIMED	ESTIMATED ACRES:
Estimate acreage of each land use below, after reclamation	
Wildlife (forest or other habitat with livestock excluded)	
Agricultural (pasture, cropland, and horticultural)	41
Development (residential, industrial, and recreational)	146 229.5 BH
Water impoundments (for wildlife, agricultural, or development)	150 as (

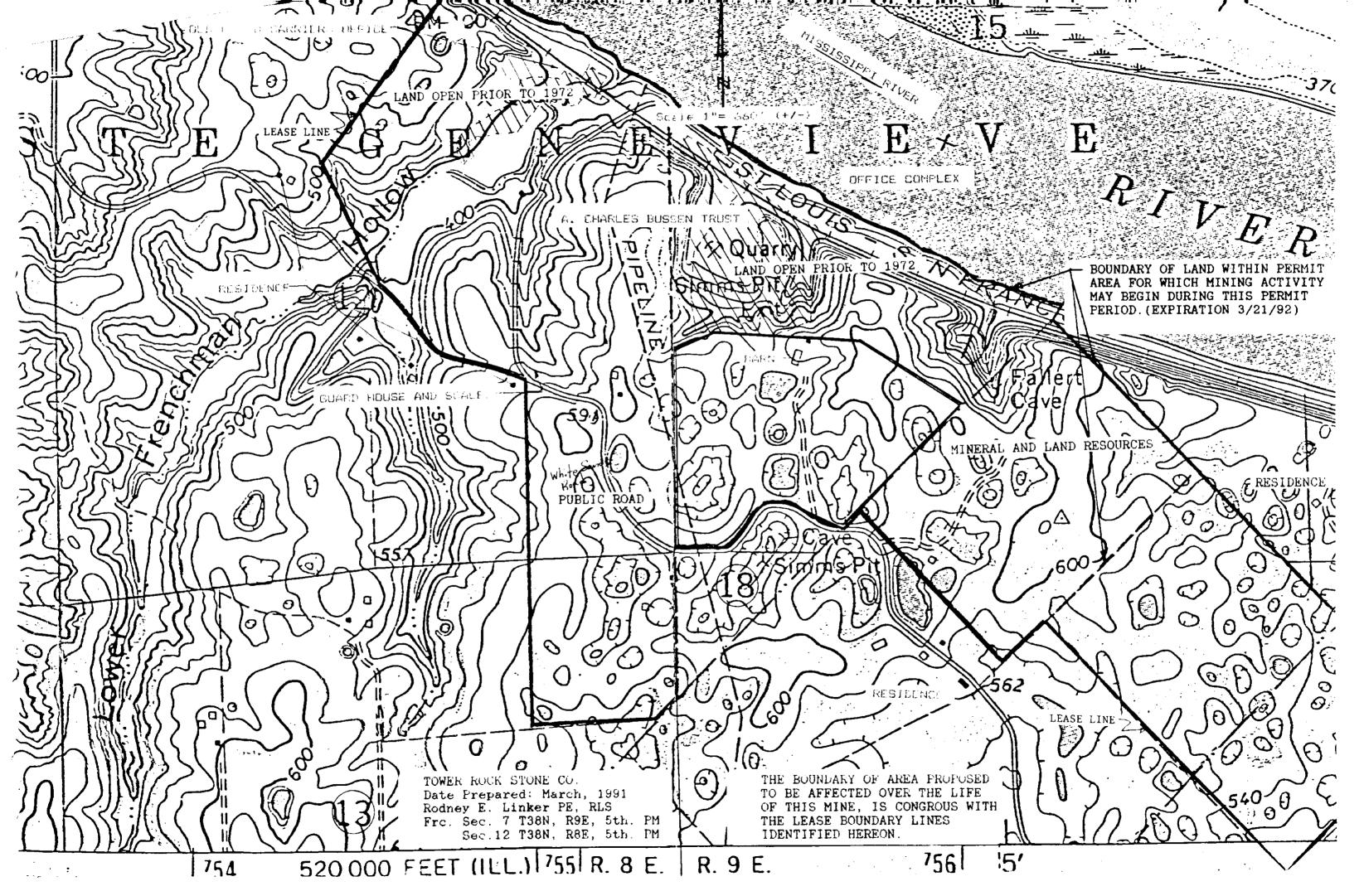
By my signature, I attest to the following:

- 1. All statements made on this Mine Plan Form are correct, complete, and true, to the best of my knowledge.
- 2. I or the company I am authorized to represent intend(s) to mine in accordance with this Mine Plan Form, and in accordance with the Missouri Land Reclamation Act, Sections 444.760 through 444.789, RSMo (Supp. 1990), and all rules, regulations, orders, decisions and permits of the Missouri Land Reclamation Commission pertaining to my company's surface mining operations.
- 3. I have obtained the approval of all landowner's for all proposed post-reclamation land uses.
- 4. I have a valid agreement with all landowners which gives me the right to grant access to the Director of the Missouri Land Reclamation Commission and his authorized representatives, and I grant such access, and further where I have no such right, I have attached signed affidavits from the landowners, granting such access.

	SIGNATURE OF APPLICANT		TITLE		DATE	,
	Gerha q Bue	Arthur A. Balt	z Secretary-T	reasurer	March 16, 1992	
~~	NOTARY PUBLIC EMBOSSER SEAL	SUBSCRIBED AND SWORN BEFORE	ME, THIS	_ Yas	ITY OF ST. LOUIS)	
	"OFFICIA <b>L SEAL"</b> Deborah K. <b>LaCroi</b> x	16th DAY OF 11	March 1993		R STAMP IN CLEAR AREA	BELOW
	Notary Public, State of Illinois My Commission Expires 3/14/95	Aborah K. Sal	loix 3/14/95	5		
•		NOTARY PUBLIC NAME (TYPED OR PRINTE Deborah K. La	Croix			
	APPROVED BY (DIRECTOR'S REPR	RESENTATIVE)	DATE APPROVED		PERMIT NUMBER	
	MILLANDS	SMMM	3-11-	04	0237	
	MO 780-1327 (12-91)	9			PA	GE 5 OF 5

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# STE. GENEVIEVE SITE EXPANSION

PERMIT BOUNDARY

